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IN THE CLAIMS:

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1. (currently amended) A method performed by a data processing system having a memory, comprising the steps of:
 - inputting a CCFG;
 - ~~augmenting the CCFG with data edges to produce an augmented CCFG;~~
 - scheduling the ~~augmented~~ CCFG to produce a scheduled ~~augmented~~ CCFG;
 - selecting a first node of the scheduled ~~augmented~~ CCFG;
 - producing a first copy of the first node for an SCFG; and
 - coupling, if a first thread of the first node is suspended, between a second node of the SCFG of a second previously-running thread and the first copy, a first context switch, wherein the context switch saves a second state, of the second previously-running thread, into a state variable dedicated to the second previously-running thread.
 2. (currently amended) The method of claim 1, wherein the first context switch is comprised of ~~achieved by adding~~ code that saves a state of a thread being suspended in a state variable and that resumes another thread by performing a multiway branch on a state variable for a thread being resumed.
 3. (original) The method of claim 1, wherein the translation of the CCFG into the SCFG produces, for each node of the CCFG, at most one corresponding node in the SCFG.
 4. (currently amended) The method of claim 1, wherein the step of scheduling comprises a topological sort for determining the scheduled ~~augmented~~ CCFG.
 5. (original) The method of claim 1, wherein an execution of the SCFG comprises translation of the SCFG into a programming language.
 6. (original) The method of claim 5, wherein the programming language is C.

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7. (original) The method of claim 1, further comprising a step of translation of the SCFG into a programming language.

8. (original) The method of claim 7, further comprising a step of executing the programming language translation of the SCFG.

b7 9. (original) The method of claim 1, wherein an execution of the SCFG comprises interpretation of the SCFG.

10. (currently amended) A data processing system having a memory, comprising the following:

a sub-system configured for inputting a CCFG;

~~a sub-system configured for augmenting the CCFG with data edges to produce an augmented CCFG;~~

a sub-system configured for scheduling the ~~augmented CCFG~~ to produce a scheduled ~~augmented CCFG~~;

a sub-system configured for selecting a first node of the scheduled ~~augmented CCFG~~;

a sub-system configured for producing a first copy of the first node for an SCFG;
and

a sub-system configured for coupling, if a first thread of the first node is suspended, between a second node of the SCFG of a second previously-running thread and the first copy, a first context switch, wherein the context switch saves a second state of the second previously-running thread into a state variable dedicated to the second previously-running thread.

11. (currently amended) A computer program product comprising a computer usable medium having computer readable code embodied therein, the computer program product including:

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computer readable program code devices configured to cause a computer to effect inputting a CCFG;

~~computer readable program code devices configured to cause a computer to effect augmenting the CCFG with data edges to produce an augmented CCFG;~~

computer readable program code devices configured to cause a computer to effect scheduling the ~~augmented~~ CCFG to produce a scheduled ~~augmented~~ CCFG;

computer readable program code devices configured to cause a computer to effect selecting a first node of the scheduled ~~augmented~~ CCFG;

computer readable program code devices configured to cause a computer to effect producing a first copy of the first node for an SCFG; and

computer readable program code devices configured to cause a computer to effect coupling, if a first thread of the first node is suspended, between a second node of the SCFG of a second previously-running thread and the first copy, a first context switch, wherein the context switch saves a second state, of the second previously-running thread, into a state variable dedicated to the second previously-running thread.

12. (currently amended) A computer data signal embodied in a carrier wave and representing sequences of instructions which, when executed by a processor, cause performance of steps of:

inputting a CCFG;

~~augmenting the CCFG with data edges to produce an augmented CCFG;~~

scheduling the ~~augmented~~ CCFG to produce a scheduled ~~augmented~~ CCFG;

selecting a first node of the scheduled ~~augmented~~ CCFG;

producing a first copy of the first node for an SCFG; and

coupling, if a first thread of the first node is suspended, between a second node of the SCFG of a second previously-running thread and the first copy, a first context switch, wherein the context switch saves a second state, of the second previously-running thread, into a state variable dedicated to the second previously-running thread.